To: Tennis, Rachel [Tennis.Rachel@epa.gov]

From: LEE, LILY

**Sent:** Tue 4/5/2016 4:37:31 PM

Subject: FW: EPA use of Current PRG Calculator to evaluate Navy cleanups

Work Pkgs 108-111 Storm drain D-1 - EPA Comments 6-29-2015.docx 2015-1-12 EPA Rad Review multiple Survey Units Oct Nov 2014.docx

EPA Comments Draft Survey Units 344-350-351-355.docx

Lily Lee

Cleanup Project Manager

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From: LEE, LILY

**Sent:** Monday, April 04, 2016 5:01 PM **To:** 'Daniel Hirsch' <dohirsch@ucsc.edu>

Cc: Walker, Stuart < Walker. Stuart@epa.gov>; Janice Davis < jadadavi@ucsc.edu>; Lucien

Martin <lumamart@ucsc.edu>; Maria Caine <mcaine@ucsc.edu>; Janie Flores

<jalflore@ucsc.edu>; Liora Huebner < lhuebner@ucsc.edu>; Flora Lu < floralu@ucsc.edu>;

bradley@greenaction.org

Subject: EPA use of Current PRG Calculator to evaluate Navy cleanups

Dear Dr. Hirsch,

Thank you for asking about EPA reviews of Navy analyses. In summary, the Navy uses the Department of Energy's RESRAD model in place of the EPA Preliminary Remediation Goal (PRG) calculator to evaluate doses and risks from contamination. EPA compares contamination

concentrations with its PRG calculator. Generally, EPA's calculations result in a smaller estimate of radiation dose and associated risk, but the results are always nearly the same. EPA advises the Navy of its findings.

More specifically, as the Navy conducts radiological cleanup work, it submits individual reports on progress. When the Navy provides EPA with drafts of its Survey Unit Project Reports (SUPR), EPA's health physicist evaluates these reports to use the most current version of the USEPA's Preliminary Remediation Goal PRG Calculator as an additional line of evidence to evaluate residual risk remaining after completion of the removal actions described in these reports. EPA's submits this evaluation as part of its comments on the draft SUPR reports, and EPA comments become part of the final SUPR reports.

Once the reports are finalized, they become part of the Administrative Record for the site. One place individual reports are available to the public is at DTSC's EnviroStor website (link for Hunters Point Naval Shipyard files at

http://www.envirostor.dtsc.ca.gov/public/search.asp?CMD=search&city=San+Francisco&zip=&county=&case\_As one recent example, which I have pulled out at random, here is a link to the files for the "Final Work Package 110, Survey Unit Project Reports, Zones K, L, M, N, and O, Parcel D-1 Phase II Sanitary Sewer and Storm Drain Removal."

http://www.envirostor.dtsc.ca.gov/regulators/deliverable\_documents/4440022110/Final%20SUPR%20Pkg%20%Zone K, USEPA's PRG table for this survey unit appears beginning on p. 2868 of this pdf file. This file is 17 MB, so for your convenience, I have attached the EPA comments for this example. I also attached a few other examples to illustrate the type of evaluation that USEPA Region IX routinely conducts for each draft report from the Navy.

The Navy prepares Five Year Reviews, but those type of documents do not typically go to this level of detail, so I thought the information above and attached would be more relevant to your questions. Please let me know what further information would be useful to you.

Lily
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From: Daniel Hirsch [mailto:dohirsch@ucsc.edu]
Sent: Wednesday, March 30, 2016 4:41 PM
To: LEE, LILY < LEE.LILY@EPA.GOV>

Cc: Walker, Stuart < Walker. Stuart@epa.gov >; Janice Davis < jadadavi@ucsc.edu >; Lucien

Martin <a href="mailto:Maria">Maria Caine</a> <a href="mailto:mcaine@ucsc.edu">mcaine@ucsc.edu</a>; Janie Flores

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bradley@greenaction.org

Subject: Re: Stuart Walker will join RE: request re conference call April 12

Hi Lily,

That's great. Thank you.

May I ask, in preparation for the call, if you could either provide me with copies, or direct me to links if they are posted on a website, for any 5-year reviews performed for portions of Hunters Point to ascertain the potential impact of revised EPA cleanup standards and guidance that may have come into being since cleanup planning and decisions and risk analyses were originally initiated? If the 5 year reviews were done by EPA, it would be helpful to see them. If they were done by the Navy, it would be helpful to be able to obtain them as well as any EPA reviews of the Navy analyses.

Also, if EPA has done any other reviews of how updated EPA guidance and standards and risk assessment methodologies might impact Hunters Point past cleanup actions, decisions, and risk analyses, it would be very helpful to see those as well.

Thanks, Daniel Hirsch Director Program on Environmental and Nuclear Policy College Ten University of California at Santa Cruz On Mar 25, 2016, at 1:58 PM, LEE, LILY < LEE.LILY@EPA.GOV > wrote: Dear Dr. Hirsch, Thank you for the questions and the suggestion to bring in Stuart. Region IX has consulted with him over the years about the Hunters Point site. I just talked with him, and he has graciously agreed to participate in the call. Lily Lily Lee Cleanup Project Manager Superfund Division U.S. Environmental Protection Agency, Region 9 75 Hawthorne St. (SFD-8-3) San Francisco, CA 94105 Tel: 415-947-4187, Fax: 415-947-3518

From: Daniel Hirsch [mailto:dohirsch@ucsc.edu]

www.epa.gov/region9/superfund

**Sent:** Sunday, March 20, 2016 7:57 PM **To:** LEE, LILY < LEE.LILY @EPA.GOV>

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Martin < lumamart@ucsc.edu >; Maria Caine < mcaine@ucsc.edu >; Janie Flores

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<floralu@ucsc.edu>; bradley@greenaction.org
Subject: request re conference call April 12

Hi Lily,

We would appreciate it if you would arrange for Stuart Walker, the EPA Superfund remedial program's National Radiation Expert, to participate in the conference call on Hunters Point issues scheduled for April 12.

We note that "Radiation Risk Assessment at CERCLA Sites Q&A," (EPA Office of Superfund Remediation and Technology Innovation Directive 9200.4-40, May 2014) states:

"Q10. For CERCLA risk assessments at remedial sites, is it appropriate to use guidance or approaches developed by other Federal, State or Tribal Agencies or by International or National Organizations?

A. EPA has made the policy decision that risks from radionuclide exposures at remedial sites should be estimated in the same manner as chemical contaminants, which is consistent with EPA's remedial program implementing guidance (e.g., EPA 1997g, 1999d, 2000f). Consequently, approaches that do not follow the remedial program's policies and guidance should not be used at CERCLA remedial sites. Should regional staff have questions, they should consult with the Superfund remedial program's National Radiation Expert (Stuart Walker of OSRTI at the time this fact sheet was issued, at (703) 603-8748 or <a href="walker.stuart@epa.gov">walker.stuart@epa.gov</a>), before using guidance from other organizations that is not already incorporated into this and other EPA Superfund remedial program guidance."

Among the issues we wish to explore during the conference call is whether remediation standards, models, and other guidance were used at Hunters Point that are inconsistent with the EPA remedial program's policies and guidance. If so, we would like to understand whether EPA Region IX consulted with Mr. Walker before allowing use of guidance that is not incorporated in EPA Superfund remedial program guidance, and if so, on what basis the approvals were made. If there was no consultation with Mr. Walker, we would like to learn why not.

Thank you.

Daniel Hirsch Director Program on Environmental and Nuclear Policy College Ten University of California at Santa Cruz